- "(1) IMPLEMENTATION.—The Administrator, in coordination with the Western Research Institute of the University of Wyoming, shall implement a test strip for the purpose of demonstrating and evaluating the unique energy and environmental advantages of using shale oil modified asphalts under extreme climatic conditions.
- "(2) FUNDING.—For the purposes of construction activities related to this test strip, the Secretary and the Director of the National Park Service shall make up to \$1,000,000 available from amounts made available from the authorization for parkroads and parkways.
- ''(3) REPORT TO CONGRESS.—Not later than November 30, 1995, the Administrator shall transmit to Congress as part of a report under subsection (e) the Administrator's findings on activities conducted under this subsection, including an evaluation of the test strip implemented under this subsection and recommendations for legislation to establish a national program to support United States transportation and energy security requirements.
- "(e) ANNUAL REPORT TO CONGRESS.—Not later than 180 days after the date of the enactment of this Act [Dec. 18, 1991], and on or before November 30th of each year beginning thereafter, the Administrator shall transmit to Congress a report of the progress made in implementing this section.
- "(f) AUTHORIZATION OF APPROPRIATIONS.—The Secretary shall expend from administrative and research funds deducted under section 104(a) of this title at least \$3,000,000 for each of fiscal years 1992, 1993, 1994, 1995, and 1996 to carry out subsection (b)."

[For termination, effective May 15, 2000, of annual reporting provisions in section 6016(e) of Pub. L. 102–240, set out above, see section 3003 of Pub. L. 104–66, as amended, set out as a note under section 1113 of Title 31, Money and Finance, and page 139 of House Document No. 103–7.]

STUDY OF FACTORS AFFECTING SAFE AND EFFICIENT OPERATION OF BRIDGES, TUNNELS AND ROADS WITHIN UNITED STATES

Pub. L. 95-599, title I, §166, Nov. 6, 1978, 92 Stat. 2722, provided that: "The Secretary of Transportation shall make a full and complete investigation and study of all those factors affecting the safe and efficient operation of bridges, tunnels, and roads within the United States, including, but not limited to, structural, operational, environmental, and civil disturbance factors."

SECTION REFERRED TO IN OTHER SECTIONS

This section is referred to in section 151 of this title.

§ 503. Technology deployment

- (a) TECHNOLOGY DEPLOYMENT INITIATIVES AND PARTNERSHIPS PROGRAM.—
 - (1) ESTABLISHMENT.—The Secretary shall develop and administer a national technology deployment initiatives and partnerships program.
 - (2) PURPOSE.—The purpose of the program shall be to significantly accelerate the adoption of innovative technologies by the surface transportation community.
 - (3) DEPLOYMENT GOALS.—
 - (A) ESTABLISHMENT.—Not later than 180 days after the date of enactment of this section, the Secretary shall establish not more than 5 deployment goals to carry out paragraph (1).
 - (B) DESIGN.—Each of the goals and the program developed to achieve the goals shall be designed to provide tangible benefits, with respect to transportation systems, in the areas of efficiency, safety, reliability, serv-

- ice life, environmental protection, and sustainability.
- (C) STRATEGIES FOR ACHIEVEMENT.—For each goal, the Secretary, in cooperation with representatives of the transportation community such as States, local governments, the private sector, and academia, shall use domestic and international technology to develop strategies and initiatives to achieve the goal, including technical assistance in deploying technology and mechanisms for sharing information among program participants.
- (4) INTEGRATION WITH OTHER PROGRAMS.—The Secretary shall integrate activities carried out under this subsection with the efforts of the Secretary to disseminate the results of research sponsored by the Secretary and to facilitate technology transfer.
- (5) LEVERAGING OF FEDERAL RESOURCES.—In selecting projects to be carried out under this subsection, the Secretary shall give preference to projects that leverage Federal funds with other significant public or private resources.
- (6) CONTINUATION OF SHRP PARTNERSHIPS.—Under the program, the Secretary shall continue the partnerships established through the strategic highway research program established under section 307(d) (as in effect on the day before the date of enactment of this section).
- (7) Grants, cooperative agreements, and contracts.—Under the program, the Secretary may make grants and enter into cooperative agreements and contracts to foster alliances and support efforts to stimulate advances in transportation technology, including—
 - (A) the testing and evaluation of products of the strategic highway research program;
 - (B) the further development and implementation of technology in areas such as the Superpave system and the use of lithium salts and other alternatives to prevent and mitigate alkali silica reactivity;
 - (C) the provision of support for long-term pavement performance product implementation and technology access; and
 - (D) other activities to achieve the goals established under paragraph (3).
- (8) REPORTS.—Not later than 18 months after the date of enactment of this section, and biennially thereafter, the Secretary shall submit to the Committee on Environment and Public Works of the Senate and the Committee on Transportation and Infrastructure of the House of Representatives a report on the progress and results of activities carried out under this section.
- (9) ALLOCATION.—To the extent appropriate to achieve the goals established under paragraph (3), the Secretary may further allocate funds made available to carry out this section to States for their use.
- (b) INNOVATIVE BRIDGE RESEARCH AND CONSTRUCTION PROGRAM.—
 - (1) IN GENERAL.—The Secretary shall establish and carry out a program to demonstrate the application of innovative material technology in the construction of bridges and other structures.

- (2) GOALS.—The goals of the program shall include—
 - (A) the development of new, cost-effective innovative material highway bridge applications:
 - (B) the reduction of maintenance costs and life-cycle costs of bridges, including the costs of new construction, replacement, or rehabilitation of deficient bridges;
 - (C) the development of construction techniques to increase safety and reduce construction time and traffic congestion;
 - (D) the development of engineering design criteria for innovative products and materials for use in highway bridges and structures:
 - (E) the development of cost-effective and innovative techniques to separate vehicle and pedestrian traffic from railroad traffic;
 - (F) the development of highway bridges and structures that will withstand natural disasters, including alternative processes for the seismic retrofit of bridges; and
 - (G) the development of new nondestructive bridge evaluation technologies and techniques.
- (3) Grants, cooperative agreements, and contracts.—
 - (A) IN GENERAL.—Under the program, the Secretary shall make grants to, and enter into cooperative agreements and contracts with—
 - (i) States, other Federal agencies, universities and colleges, private sector entities, and nonprofit organizations to pay the Federal share of the cost of research, development, and technology transfer concerning innovative materials; and
 - (ii) States to pay the Federal share of the cost of repair, rehabilitation, replacement, and new construction of bridges or structures that demonstrate the application of innovative materials.
 - (B) APPLICATIONS.—To receive a grant under this subsection, an entity described in subparagraph (A) shall submit an application to the Secretary. The application shall be in such form and contain such information as the Secretary may require. The Secretary shall select and approve the applications based on whether the project that is the subject of the grant meets the goals of the program described in paragraph (2).
- (4) TECHNOLOGY AND INFORMATION TRANSFER.—The Secretary shall take such action as is necessary to ensure that the information and technology resulting from research conducted under paragraph (3) is made available to State and local transportation departments and other interested parties as specified by the Secretary.
- (5) FEDERAL SHARE.—The Federal share of the cost of a project under this section shall be determined by the Secretary.

(Added Pub. L. 105-178, title V, §5103, June 9, 1998, 112 Stat. 427.)

REFERENCES IN TEXT

The date of enactment of this section, referred to in subsec. (a)(3)(A), (6), (8), is the date of enactment of Pub. L. 105-178, which was approved June 9, 1998.

PRIOR PROVISIONS

A prior section 503, added Pub. L. 90–495, §30, Aug. 23, 1968, 82 Stat. 831, related to administration of highway relocation assistance program, prior to repeal by Pub. L. 91–646, title II, §220(a)(10), Jan. 2, 1971, 84 Stat. 1903.

SECTION REFERRED TO IN OTHER SECTIONS

This section is referred to in title 49 section 5505.

§ 504. Training and education

- (a) NATIONAL HIGHWAY INSTITUTE.—
- (1) IN GENERAL.—The Secretary shall operate in the Federal Highway Administration a National Highway Institute (in this subsection referred to as the "Institute"). The Secretary shall administer, through the Institute, the authority vested in the Secretary by this title or by any other law for the development and conduct of education and training programs relating to highways.
- (2) DUTIES OF THE INSTITUTE.—In cooperation with State transportation departments, United States industry, and any national or international entity, the Institute shall develop and administer education and training programs of instruction for—
 - (A) Federal Highway Administration, State, and local transportation agency employees;
 - (B) regional, State, and metropolitan planning organizations;
 - (C) State and local police, public safety, and motor vehicle employees; and
 - (D) United States citizens and foreign nationals engaged or to be engaged in surface transportation work of interest to the United States.
- (3) Courses.—The Institute may develop and administer courses in modern developments, techniques, methods, regulations, management, and procedures relating to surface transportation, environmental mitigation and compliance, acquisition of rights-of-way, relocation assistance, engineering, safety, construction, maintenance and operations, contract administration, motor carrier safety activities, inspection, and highway finance.
- (4) SET-ASIDE; FEDERAL SHARE.—Not to exceed ½ of 1 percent of the funds apportioned to a State under section 104(b)(3) for the surface transportation program shall be available for expenditure by the State transportation department for the payment of not to exceed 80 percent of the cost of tuition and direct educational expenses (excluding salaries) in connection with the education and training of employees of State and local transportation agencies in accordance with this subsection.
 - (5) FEDERAL RESPONSIBILITY.—
 - (A) IN GENERAL.—Except as provided in subparagraph (B), education and training of employees of Federal, State, and local transportation (including highway) agencies authorized under this subsection may be provided—
 - (i) by the Secretary at no cost to the States and local governments if the Secretary determines that provision at no cost is in the public interest; or
 - (ii) by the State through grants, cooperative agreements, and contracts with pub-